Chapter 335. SIGNIFICANT WILDLIFE HABITAT

SUMMARY: These rules outline requirements associated with a Natural Resources Protection Act permit for an activity impacting significant wildlife habitat.

1. Applicability. This chapter applies to an activity that takes place in, on, or over a significant wildlife habitat, or adjacent to a significant wildlife habitat contained within a freshwater wetland, _and requires approval from the department pursuant to the Natural Resources Protection Act (NRPA), 38 M.R.S.A. §§ 480-A et. seq. This chapter applies to an application for an individual permit under the NRPA and describes basic standards for an activity affecting a significant wildlife habitat.

NOTE: If a significant wildlife habitat contains a coastal wetland, great pond, river, stream, or brook, or freshwater wetland, the applicant is also required to comply with Chapter 310, The Wetlands and Waterbodies Protection Rules.

2. Definitions. As used in this chapter, unless the context otherwise indicates, the following terms have the following meanings.

The terms "freshwater wetland" and "significant wildlife habitat" have the same meaning as defined in the NRPA in 38 M.R.S.A. § 480-B.

A. Activity. Dredging, bulldozing, removing or displacing soil, sand, vegetation or other materials, draining or otherwise dewatering; filling or any construction, repair or alteration of any permanent structure in, on, or over a significant wildlife habitat, or adjacent to a significant wildlife habitat contained within a freshwater wetland, as applicable under the NRPA.

On a case-by-case basis as determined by the department, the term "activity" may not include:

- (1) The disturbance of very little soil through an activity such as installing a fence post or planting shrubs by hand;
- (2) The addition of a minor feature, such as a bench or hand rail, to a structure; or
- (3) The construction, repair or alteration of a small structure with minimal impact such as a nesting box, pasture fence, or staff gauge.
- **B.** Adjacent to a significant wildlife habitat. The area within 75 feet, measured horizontally, of the edge of a significant wildlife habitat contained within a freshwater wetland.
- **C. Existing development area**. The area of property altered including, but not limited to, buildings, driveways, parking areas, wastewater disposal systems, lawns and other non-native vegetation, as of the effective date of this chapter.
- **D.** Practicable. Available and feasible considering cost, existing technology and logistics based on the overall purpose of the project.
- **E. Subject wildlife.** Wildlife species for which an area has been designated as significant wildlife habitat.

3. General standards applicable to all activities

- **A. Avoidance.** No activity that would degrade the significant wildlife habitat, disturb the subject wildlife, or affect the continued use of the significant wildlife habitat by the subject wildlife, either during or as a result of the activity, is permitted if there is a practicable alternative to the project that would be less damaging to the environment.
- **B. Minimal alteration**. Alteration of the habitat and disturbance of subject wildlife must be kept to the minimum amount necessary by, among other methods, minimizing the size of the alteration, the duration of the activity, and its proximity to the significant wildlife habitat and subject wildlife. Temporary structures must be used instead of permanent structures wherever possible and more protective of the significant wildlife habitat or subject wildlife.
- C. No unreasonable impact. Even if the activity has no practicable alternative, and the applicant has minimized the proposed alteration as much as possible, the application will be denied if the activity will have an unreasonable impact on protected natural resources or the subject wildlife. "Unreasonable impact" means that one or more of the standards of the NRPA at 38 M.R.S.A. § 480-D will not be met. In making this determination, the department considers the area of the significant wildlife habitat affected by the activity, including areas beyond the physical boundaries of the project and the cumulative effects of frequent minor alterations of significant wildlife habitats.

In order to meet the "harm to habitats; fisheries" standard at 38 M.R.S.A. § 480-D(3), the following requirements must be met.

- (1) Unreasonable degradation, disturbance, or effect. The activity may not unreasonably degrade the significant wildlife habitat, unreasonably disturb subject wildlife, or unreasonably affect the continued use of the site by the subject wildlife.
- (2) Timing. The department may require that cConstruction activities must be done atoccur during a time when impacts on protected habitats, wildlife, fisheries and aquatic life will be minimized, such as outside of any critical nesting or breeding periods or similar critical periods, depending on the specific habitat and species. For example, an activity that could potentially cause sedimentation, such as excavation, may not be carried out during times of the year when fish are spawning. This requirement must be met unless the work can only practically be completed at that time, and it is determined by the department that the impacts to the protected natural resource will be short term, and will not result in permanent harm to fish, wildlife, or marine resources.
- **D.** Compensation. Compensation is the off-setting of a lost habitat function with a function of equal or greater value. The goal of compensation is to achieve no net loss of habitat functions and values. Every case where compensation may be required is unique due to differences in habitat type and geographic location. For this reason, the method, location, and amount of compensation work necessary is variable.
 - (1) Location of compensation. Compensation on-site or within very close proximity to the affected significant wildlife habitat is preferred to off-site compensation, although in some instances the department may determine that off-site compensation may be used or is preferable to off-set impacts.

- NOTE: Where habitat priorities have been established at a local, regional, or state level, these priorities should be considered in devising a compensation plan in the area to allow the applicant to look beyond on-site and in-kind compensation possibilities. Directional buffers may also be used in some instances to off-set impacts.
- (2) When required. Compensation is required when the department determines that an impact to significant wildlife habitat will cause habitat functions or values to be lost or degraded as identified by the department's or the Department of Inland Fisheries & Wildlife's evaluation of the project.
- (3) Compensation amounts. The amount of compensation required to replace lost functions depends on a number of factors including: the size of the alteration activity; the functions of the habitat to be altered; the type of compensation to be used; and the characteristics of the compensation site. Compensation must be performed to meet the following ratios at a minimum, unless the department finds that a different ratio is appropriate to directly off-set habitat functions to achieve an equal or higher net benefit for habitat:
 - (a) 2:1 for restoration, enhancement, or creation;
 - (b) 8:1 for preservation, including adjacent upland or wetland habitat.
- (4) Waiver. The department may waive the requirement for an assessment of habitat functions and values, compensation, or both. The department may waive the requirement for an assessment of the habitat if it already possesses the information necessary to determine the functions and values of the area proposed to be altered. The department may waive the requirement for compensation if it determines that the impact to habitat functions and values from the activity will be insignificant.
- **E. Seasonal factors.** When determining the significance of a wildlife habitat or impact from a proposed activity, seasonal factors and events that temporarily reduce the numbers and visibility of plants or animals, or obscure the topography and characteristics of a habitat such as a period of high water, snow and ice cover, erosion event, or drought are taken into account. Determinations may be deferred for an amount of time necessary to allow assessment of the resource without such seasonal factors.

4. Pre-application and pre-submission meetings.

- A. Purpose. The pre-application meeting between the applicant and the department is an opportunity for the applicant to determine the statutory and regulatory requirements that apply to a specific activity. The purpose of this meeting is to identify issues, processing times, fees and the types of information and documentation necessary for the department to properly assess the activity. The pre-submission meeting is an opportunity to review the assembled application to ensure that the necessary types of information have been included prior to filing the application.
- **A.** When required. A pre-application and pre-submission meeting is required for any activity that takes place in, on, or overand requires an individual permit under the NRPA.

NOTE: Activities requiring an NRPA permit are described at 38 M.R.S.A. § 480-C. Exemptions are described at 38 M.R.S.A. § 480-Q.

- **B. Submissions and scheduling**. The following information and items must be submitted prior to scheduling a pre-application meeting with the department.
 - (1) Sketch plan. A sketch plan of the site showing the proposed activity, adjacent structures and features, property lines, and the significant wildlife habitat, with all distances and dimensions approximately to scale.
 - (2) Location map. A map showing the location of the proposed project site in relation to major roads and landmarks.
 - (3) Description of activity. A brief description of the activity including its dimensions.
 - (4) Description of significant wildlife habitat. A description of the significant wildlife habitat to be altered.
 - (5) Description of probable impacts. A description of probable impacts of the activity on the subject wildlife, significant wildlife habitat, and any other protected natural resources.
 - (6) Photographs. Photographs of the project area showing its characteristics.
- 5. Submission requirements. The applicant shall submit evidence that affirmatively demonstrates that the activity will meet the standards of the NRPA and this chapter including, but not limited to, the information listed below. Because of the site-specific nature of activities and potential impacts to significant wildlife habitat, the department may, on a case-by-case basis, require more or less information than specified in this section, in order to determine whether the standards will be met. Failure to provide any requested information necessary for the processing of the application may result in the application not being accepted as complete for processing or denial of the application.
 - A. Report addressing Description of avoidance measures. A narrative describing report analyzing whether a practicable alternative to the alteration exists that would be less damaging to the environment and what alternatives were considered during project design. The report narrative must address why the activity cannot avoid or lessen impacts to the significant wildlife habitat by utilizing, managing or expanding one or more other sites; reducing the size, scope, configuration or density of the proposed activity; developing alternative project designs; or by some other means.
 - **B.** Site description and impacts report. A report narrative addressing the following.
 - (1) Description of activity. A narrative including the following:
 - (a) The dimensions of the activity, the activity site, and the area of the significant wildlife habitat to be altered;
 - (b) The impacts of the activity on subject wildlife and protected natural resources; and
 - (c) The nature and timing of procedures intended to reduce the impacts of the activity on subject wildlife and protected natural resources.

- (2) Location map. A map showing the location of the proposed activity site in relation to major roads and landmarks.
- (3) Drawings (Sketch plan). Scale drawings (overhead and side views) showing dimensions of the activity, the activity site, and the area of the significant wildlife habitat to be altered.
- (4) Description of site characteristics. A description of existing significant wildlife habitat characteristics.
- (5) Photographs. Photographs of the activity area, showing its characteristics.
- (6) Description of activity construction. A description of how the activity will be constructed with information on how the activity site will be accessed, and any erosion control measures proposed.
- **6. Terms and conditions.** The department may, as a term or condition of approval, establish any reasonable requirement to ensure that the proposed activity will meet the standards of Title 38 M.R.S.A. § 480-D and comply with this chapter.
- **7. Severability.** Should any provision of these rules be declared invalid or ineffective by court decision, the decision shall not invalidate any other provision of these rules.
- **8. Seabird nesting island**. Seabird nesting islands are significant wildlife habitats. An activity impacting a seabird nesting island must meet the standards of this chapter.

Seabirds live over the open ocean, returning to land only once a year to nest, and their survival depends on undisturbed nesting habitat. Small, unforested, rocky islands such as those off the coast of Maine provide a setting free of mammalian predators such as foxes, coyotes, and raccoons. Flying distance from the mainland discourages avian predators such as great horned owls. Many seabird species nearly eradicated in Maine by the end of the 19th century have recovered dramatically, thanks to the passage of state and federal conservation laws and the restoration efforts of dedicated scientists. In 1998, 234 seabird nesting Islands in Maine were afforded protection as Significant Wildlife Habitat under the Natural Resource Protection Act.

- **A. Definitions**. As used in this chapter, unless the context otherwise indicates, the following terms have the following meanings.
 - (1) Seabird. Colonial nesting waterbirds including Leach's Storm-petrel, Great Cormorant, Double-crested Cormorant, Laughing Gull, Herring Gull, Great Black-backed Gull, Common Tern, Arctic Tern, Roseate Tern, Razorbill, Black Guillemot, Atlantic Puffin, and Common Eider.
 - (2) Seabird nesting island. (a) An island, ledge, or portion thereof in tidal waters that has documentation of 25 or more: nests or seabirds, adult seabirds displaced from nests, or in combination (single species or aggregate of different species) in any nesting season during, or since, 1976; provided that the island, ledge, or portion thereof continues to have suitable nesting habitat. (b) An island, ledge, or portion thereof in tidal waters that has documentation of one or more nests of a seabird that is a Maine endangered or threatened species in any year during, or since, 1976 provided that the island, ledge, or portion thereof, continues to have suitable nesting habitat.

B. Maps. Seabird nesting islands are delineated on 7.5 minute U.S. Coast and Geodetic Survey maps developed by the Maine Department of Inland Fisheries and Wildlife. The maps are identified as Significant Wildlife Habitat Seabird Nesting Island Maps #1-55, January 1998.

NOTE: The criteria used to define seabird nesting islands was developed by the Maine Department of Inland Fisheries and Wildlife (09-137 CMR 10.02(F)). Maps of seabird nesting islands are on file atavailable from the Department of Environmental Protection's offices in Portland, Augusta, and Bangor, and in town offices or the Maine Department of Inland Fisheries and Wildlife (IF&W).

- **C.** Removal or displacement of vegetation. For seabird nesting islands, removal or displacement of vegetation does not include:
 - (1) Gardening, lawn cutting, removal of fallen vegetation, and tree and shrub pruning within an existing development area as of the effective date of this chapter.
 - (2) Removal of an entire tree when it threatens a building.
- **D. Seabird critical nesting period.** The seabird critical nesting period is from April 15 to August 31 each year unless otherwise approved by the Maine Department of Inland Fisheries and Wildlife.

9. Significant vernal pools.

A vernal pool, also referred to as a seasonal forest pool, is a natural, temporary to semi-permanent body of water occurring in a shallow depression that typically fills during the spring or fall and may dry during the summer. Vernal pools have no permanent inlet and no viable populations of predatory fish. A vernal pool may provide the primary breeding habitat for wood frogs (*Rana sylvatica*), spotted salamanders (*Ambystoma maculatum*), blue-spotted salamanders (*Ambystoma laterale*), and fairy shrimp (*Eubranchipus* sp.), as well as valuable habitat for other plants and wildlife, including several rare, threatened, and endangered species. A vernal pool intentionally created for the purposes of compensatory mitigation is included in this definition.

Whether a vernal pool is a significant vernal pool is determined by the number and type of pool-breeding amphibian egg masses in a pool, or the presence of fairy shrimp, or use by threatened or endangered species as specified in Section 9(B). Significant vernal pool habitat consists of a vernal pool depression and a portion of the critical terrestrial habitat within a 250 foot radius of the spring or fall high water mark of the depression. An activity that takes place in, on, over, or adjacent to a significant vernal pool habitat must meet the standards of this chapter.

NOTE: The term vernal (vernal = spring) pool is used in the Natural Resources Protection Act, and has typically been used to discuss the types of pools described in Section 9. However, because some pools are wet in both spring and fall, and others are never dry, they have also been referred to as "seasonal forest pools." Vernal pool is still a common term, and will continue to be used in this section.

NOTE: The 250 feet of critical terrestrial habitat protected as significant vernal pool habitat is only a portion of the habitat used by adult wood frogs, ambystomatid salamanders, and threatened and endangered species. Tracking studies of adult pool-breeding amphibians have shown that they can travel over a halfthird-mile away from their breeding pool, and that a radius of

750 feet around the pool is optimal for protecting viable amphibian populations. The department encourages efforts to protect more habitat adjacent to a vernal pool than this regulation has authority over.

NOTE: For more information on identifying vernal pools, see "Maine Citizen's Guide to Locating and Documenting Vernal Pools." Maine Audubon Society, 2003 or the department's fact sheet entitled "Locating and Documenting Significant Vernal Pools".

- **A. Definitions.** As used in this section, unless the context otherwise indicates, the following terms have the following meanings.
 - (1) Critical terrestrial habitat. Uplands and wetlands associated with significant vernal pools used by pool breeding amphibians for migration, feeding, and hibernation, in particular, forested wetlands and forested uplands that provide deep organic litter, coarse woody debris and canopy shade.
 - (2) Egg mass. Three or more individual eggs clumped in a gelatinous matrix constitute an egg mass. Egg masses often occur in clusters, but each mass within a cluster must be counted as an individual egg mass.
 - (3) Natural. A natural vernal pool includes pools of natural origin that have been modified or excavated. A natural vernal pool does not include other natural wetland types (wet meadows, marshes, etc.) that have been altered and currently function as vernal pools.
 - (4) Pool-breeding amphibians. Animals that, as part of their life cycle, reproduce in vernal pools. Most pool-breeding amphibians return to reproduce in the pool where they originated. Most adult pool-breeding amphibians spend less than one month in breeding pools; the rest of their annual cycle is spent in critical terrestrial habitat.
 - (5) Vernal pool depression. This area includes the vernal pool depression up to the spring or fall high water mark, and includes any vegetation growing within the depression.
- **B.** Significant vernal pool identification criteria. Vernal pool significance must be determined and documented by an individual who has experience and training in either wetland ecology or wildlife ecology and therefore has qualifications sufficient to identify and document a significant vernal pool.
 - (1) Abundance. Any one of or combination of the following species abundance levels, documented in any given year, determine the significance of a vernal pool.

Species	Abundance Criteria	
Fairy shrimp	Presence in any life stage.	
Blue spotted salamanders	Presence of 10 or more egg masses.	
Spotted salamanders	Presence of 20 or more egg masses.	
Wood frogs	Presence of 40 or more egg masses.	

- (2) Rarity. A pool that has documented use in any given year by state-listed rare, endangered or threatened species that commonly require a vernal pool to complete a critical portion of their life-history is a significant vernal pool. Examples of vernal pool dependent state-listed endangered or threatened species include, but are not limited to, Blanding's turtles, Spotted turtles, and Bog haunter dragonflies.
- (3) Identification period. Egg masses must be counted just past the peak breeding period of pool-breeding amphibians. Abundance of pool-breeding amphibians can only be used to determine the presence of a significant vernal pool during the identification period. The presence of fairy shrimp or a state-listed endangered or threatened species may be used to determine the presence of a significant vernal pool at times of the year other than the identification period.

NOTE: If present, additional rare indicator species are likely to be associated with a significant vernal pool from early spring through September. These species include ribbon snakes, wood turtles, and four-toed salamanders.

NOTE: Optimal times for counting egg masses of pool- breeding amphibians vary according to geographic location and weather. For instance, during cold springs, breeding can begin as much as 2 weeks later than it does in warm, wet springs. The optimal time to count masses is just past the peak breeding period. For wood frogs, this occurs approximately 2 weeks after they start full choruses. Wood frog egg masses hatch very quickly and are more difficult to count much past peak breeding. Salamanders do not have one peak; they often take 4 to 6 weeks to complete egg-laying. Furthermore, their egg masses do not hatch quickly and can be surveyed later than those of wood frogs. The following are guidelines for optimal times for counting egg masses:

Geographic Region	Wood Frogs	Spotted & Blue Spotted Salamanders
Northern Maine	May 1 – May 21	May 10 – May 31
Southern Maine	April 7 – April 21	April 20 – May 21

- (4) Geographic region. For the purposes of this chapter, the Northern Maine region is considered to be approximately that part of the state north of a line extending from Fryeburg to Auburn to Skowhegan to Bangor to Calais. Similarly, the Southern Maine region is considered to be approximately that part of the state south of that same line.
- (5) Seasonality. The department may require an assessment of significance by a qualified individual during the identification period. In any season, indicators of a vernal pool may include flat topography with depressions or pit-and-mound topography, fingernail clams, caddisfly cases, and evidence of temporary flooding.

- (6) Voluntary identification. An individual may voluntarily submit inform—documention to the department or the Maine Department of Inland Fisheries & Wildlife (IF&W) regarding the significance of a vernal pool on that individual's property. Documentation must be completed by an individual who has experience and training in either wetland ecology or wildlife ecology and therefore has qualifications sufficient to identify and document a significant vernal pool, or field verified by the department or the Maine Department of Inland Fisheries & Wildlife (IF&W) of a significant vernal pool on that individual's property. either the department or IF&W prior to its inclusion on a Geographic Information System (GIS) data layer maintained by either IF&W or the department. A landowner Will receive written confirmation of such documentation from the department. W will verify the presence of the pool and place it on a Geographic Information System (GIS) data layer maintained by either IF&W or the department.
- (7) Verification of significance. A significant vernal pool documented on a Geographic Information System (GIS) data layer maintained by either IF&W or the department is eligible for removal from that data layer following IF&W verification of three consecutive years of data demonstrating that a vernal pool no longer meets the criteria in Sections 9 (B)(1) or (2). A written request to remove a significant vernal pool from the data layer must be submitted to both IF&W and the department and include documentation made during the identification period by an individual who has experience and training in either wetland ecology or wildlife ecology and therefore has qualifications sufficient to identify and document presence or absence of a significant vernal pool. A written department determination that a vernal pool is not significant remains valid regardless of timeframe.
- (7) Department determination. Upon request from a landowner, department staff will provide a written field determination regarding the presence or absence of significant vernal pool habitat. The department may not seek a civil monetary penalty from a landowner who acted in accordance with a written field determination if the penalty would be based solely on an activity which is a violation of law but was carried out based on the written field determination.

NOTE: For more information on identifying vernal pools, see "Maine Citizen's Guide to Locating and Documenting Vernal Pools." Maine Audubon Society, 2003.

NOTE: For more information on managing the critical terrestrial habitat surrounding vernal pools, see:

Calhoun, A.J.K. and M.W. Klemens. 2002. Best development practices: Conserving pool-breeding amphibians in residential and commercial developments in the northeastern United States. MCA Technical Paper No. 5, Metropolitan Conservation Alliance, Wildlife Conservation Society, Bronx, New York.

Calhoun, A.J.K. and P. deMaynadier. 2004. Forestry habitat management guidelines for vernal pool wildlife. MCA Technical Paper No. 6, Metropolitan Conservation Alliance, Wildlife Conservation Society, Bronx, New York.

- C. Habitat management standards for significant vernal pools. To the greatest extent practicable, the following management practices must be followed within significant vernal pool habitat.
 - (1) No disturbance within the vernal pool depression;

- (2) Maintain a minimum of 75% of the critical terrestrial habitat as unfragmented forest with at least a partly-closed canopy of overstory trees to provide shade, deep litter and woody debris.
- (3) Maintain or restore forest corridors connecting wetlands and significant vernal pools;
- (4) Minimize forest floor disturbance; and
- (5) Maintain native understory vegetation and downed woody debris.

If more than 25% of the critical terrestrial habitat has been previously developed, restoring a portion of that area through supplemental planting or regrowth of native forest species may be considered toward meeting these standards, or towards standards for avoidance, minimization, or compensation. For purposes of this chapter, developed area includes disturbed areas excluding areas that are returned to a condition with the same drainage patterns and the same or improved cover type that existed prior to the disturbance;

D. Permit by Rule. An activity occurring in, on, over, or adjacent to a significant vernal pool or a potential significant vernal pool is eligible for a Permit by Rule (PBR) as described in Chapter 305, Section 19, provided that the habitat management standards in Section 9 (C) above are met. An applicant submitting a Permit by Rule notification pursuant to Chapter 305, Section 19, is not required to provide a seasonal assessment of significance.

Submission of a PBR notification pursuant to this section does not negate an applicant's ability to submit subsequent documentation to verify or negate applicability of Section 9 of this chapter provided that documentation is completed during the identification period by an individual who has experience and training in either wetland ecology or wildlife ecology. GIS data points specific to Chapter 305, Section 19, will be uploaded to the GIS data layer maintained by IF&W only following submission and verification of such documentation by department or IF&W.

This section does not apply to an activity that is not or will not be in compliance with the terms and conditions of a permit issued under the Site Location of Development Law, 38 M.R.S.A. Sections 481 to 490, the Stormwater Management Law, 38 M.R.S.A. Section 420-D, or the Natural Resources Protection Act, 38 M.R.S.A. Sections 480-A to BB.

- **<u>CE. Permit not required.</u>** A permit is not required from the department under the following circumstances.
 - (1) Forest management activities. Forest management activities within 250 feet of a significant vernal pool do not require a permit pursuant to this section if the significant vernal pool is not defined and mapped according to 38 M.R.S.A. § 480-I.
 - (2) Location of pool. An activity impacting a significant vernal pool does not require a permit pursuant to this section if the significant vernal pool depression is not located on a parcel owned or controlled by the person carrying out the activity. A permit is required, however, if the significant vernal pool is either defined and mapped according to 38 M.R.S.A. § 480-I or is located on a Geographic Information System (GIS) data layer maintained by either IF&W or the department. This provision does not apply if evidence of property transfers indicate an intent to evade regulation under the Natural Resources Protection Act.

- (3) Department determination. If, upon request from a landowner, department staff provide a written field determination or advisory opinion regarding the presence or absence of a significant vernal pool, a landowner acting on that determination or advisory opinion by carrying out an activity subsequently found to be in violation is not required to obtain a permit for that activity and will not be subject to enforcement action if jurisdiction or penalty would be based solely on that activity.
- (4) Communications and electric facilities. Construction of overhead communications and electric lines, poles, guy anchors, and related overhead infrastructure located within a public or private right of way, within 25 feet of the edge of the road right of way, or within an existing clearing created for a public or private road does not require a permit pursuant to this section provided that poles are not placed within a significant vernal pool depression.

NOTE: GIS data layer information may be obtained at IF&W and MDEP offices.

- **F. Implementation date.** Section 9 may not be enforced or implemented until September 1, 2007. All other sections of this chapter will be enforced or implemented as of the effective date of this rule.
- 10. High and moderate value waterfowl and wading bird habitat. High and moderate value waterfowl and wading bird habitats are significant wildlife habitats. Waterfowl are members of the family Anatidae including but not limited to brant, wild ducks, geese, and swans. Wading birds include but are not limited to herons, glossy ibis, bitterns, rails, coots, common moorhens, and sandhill cranes. An activity that takes place in, on, over, or adjacent to a high and moderate value waterfowl and wading bird habitat must meet the standards of this chapter. High and moderate value waterfowl and wading bird habitats subject to this chapter are depicted on a GIS data layer maintained by IF&W and available from either IF&W or the department.

NOTE: The IF&W rating procedure and list of waterfowl and wading bird species was created December 22, 1993, updated September 1, 2005, and is available at IF&W offices and on line at http://www.maine.gov/ifw/index.html.

- **A. Inland habitat identification criteria.** A high to moderate value inland habitat is an inland wetland complex, and a 250 foot wide zone surrounding the wetland complex, that through a combination of dominant wetland type, wetland diversity, wetland size, wetland type interspersion, and percent open water meets IF&W guidelines or is an inland wetland complex that has documented outstanding use by waterfowl or wading birds. Determination of high to moderate value inland habitat is based on the following.
 - (1) Wetland type. Dominant wetland type is rated by the assigned score for the wetland type of greatest area in the wetland. Wetland type is determined using the classification system published by IF&W based on McCall, 1972, for waterfowl and wading bird habitat rating. A score for the value to waterfowl and wading birds is assigned to each type using the IF&W rating procedure.
 - (2) Wetland diversity. Wetland diversity is rated by assigning the wetland to one of the diversity categories based on the number of wetland types present in the wetland using the IF&W rating procedure.

- (3) Wetland size. Wetland size is rated by assigning the wetland to one of three size categories based on the total area of the wetland using the IF&W rating procedure.
- (4) Interspersion. Wetland type interspersion is rated by assigning the wetland to one of three interspersion categories using the Golet (1974) system, as modified for Maine in the IF&W rating procedure.
- (5) Open water. Percent open water is rated by assigning the wetland tone of four categories, based on the percent of the wetland in open water using the IF&W rating procedure.

NOTE: The following are literature citations as referenced above:

McCall, C.A. 1972. Manual for Maine wetlands inventory. Maine Department of Inland Fisheries and Game, Augusta, Maine. 38pp.

Golet, F.C., and J.S. Larson. 1974. Classification of freshwater wetlands in the glaciated northeast. Resource Publication 116. U.S. Department of the Interior, Washington, D.C. 56pp.

- **B.** Tidal habitat identification criteria. A high or moderate value tidal habitat is as defined in IF&W's rating procedure or is a tidal habitat that has documented outstanding use by waterfowl or wading birds or use by a rare species of waterfowl or wading birds. Habitat type is determined using the classification system published by Cowardin et al. (1979) and defined in the IF&W rating procedure. Four habitat types considered as potential high or moderate value tidal habitat tidal habitat are described below.
 - (1) Aquatic bed habitat. The extent of aquatic bed habitat for the delineation of high value tidal waterfowl and wading bird habitat will be defined by the eelgrass (*Zostera marina*) beds currently mapped by Maine Department of Marine Resources. Eelgrass beds greater than 25 acres in size are high value. Eel grass beds greater than or equal to 2.5 acres but less than 25 acres are moderate value.
 - (2) Reefs. Reefs included in tidal waterfowl and wading bird habitat in Maine are limited to mussel bars or beds. All mussel bars or beds are high value tidal waterfowl and wading bird habitat.
 - (3) Emergent wetlands. Emergent wetlands equal to or greater than 25 acres in size are high value. Emergent wetlands greater than or equal to 2.5 acres but less than 25 acres are moderate value.
 - (4) Mudflats. Mudflats equal to or greater than 25 acres are high value tidal waterfowl and wading bird habitat. Mudflats greater than or equal to 12.5 acres but less than 25 acres are moderate value. Mudflat immediately adjacent to one of the above habitats will result in the combined habitats being rated high if the total area is greater than 25 acres in size or moderate if the combination is greater than or equal to 2.5 acres but less than 25 acres.

NOTE: The following are literature citations as referenced above:

Cowardin, L.W., V. Carter, F.C. Golet, and E.T. LaRoe. 1979. Classification of wetlands and deepwater habitats of the United States. U.S. Department of the Interior, Washington, D.C. 103 pp.

- C. Verification of habitat value. An individual may voluntarily submit documention to the department or the Maine Department of Inland Fisheries & Wildlife (IF&W) regarding the value of a waterfowl and wading bird habitat on that individual's property. Documentation must be completed by an individual who has experience and training in either wetland ecology or wildlife ecology and therefore has qualifications sufficient to identify and document a high or moderate value waterfowl and wading bird habitat, or field verified by IF&W. Following review of such documentation, IF&W may modify the boundary of a high or moderate value waterfowl and wading bird habitat depicted on the applicable GIS data layer. A landowner will receive written confirmation of such documentation from the department.
- D. Department determination. A GIS data layer depicting locations of high and moderate value waterfowl and wading bird habitats is maintained by IF&W and is available from either IF&W or the department. If, upon request from a landowner, department staff provide a written field determination or advisory opinion regarding the presence or absence of a high or moderate value waterfowl and wading bird habitat, a landowner acting on that determination or advisory opinion by carrying out an activity subsequently found to be in violation is not required to obtain a permit for that activity and will not be subject to enforcement action if jurisdiction or penalty would be based solely on that activity.
- 11. Shorebird nesting, feeding, and staging areas. High or moderate value shorebird nesting, feeding, and staging areas, and a 250 foot wide zone surrounding those areas, are significant wildlife habitats. Shorebird species include the members of the families Scolopacidae, Charadriidae, and Haematopodidae, including, but not limited to, sandpipers and plovers. A complete list of species is provided in the Maine Department of Inland Fisheries and Wildlife (IF&W) procedures for classifying significant shorebird habitat. An activity that takes place in, on, over, or adjacent to a high and moderate value shorebird nesting, feeding, and staging area habitat must meet the standards of this chapter. High and moderate value shorebird habitats subject to this chapter are depicted on a GIS data layer maintained by IF&W and available from either IF&W or the department. To date, However, IF&W has not adopted a definition of nesting area habitat—at this time, and therefore no criteria are presently included in this regulation.

Maine feeding and staging areas provide migrating shorebirds with the food resources to acquire the large fat reserves necessary to fuel their transoceanic migration to wintering areas. Shorebird staging habitats include both feeding areas where shorebirds congregate to feed and roosting areas used by shorebirds to rest during high water when feeding areas are unavailable.

A. Definitions.

- (1) Feeding. Waterfowl and wading bird feeding habitats include areas used by breeding adults, juvenile, and sub-adults or non-breeding birds.
- (2) Staging. Waterfowl and wading bird staging habitats include areas used for feeding, roosting, and loafing during spring and fall migration and post-breeding dispersal.
- **B.** Shorebird nesting, feeding, and staging area identification criteria. A feeding or staging site qualifies as significant shorebird habitat if either of the following criteria is met, as determined by an individual with experience or training in wildlife ecology:

- (1) Number of observations. The mean number of shorebird observations since 1987 for a site is 10% or more of the total mean number of shorebirds surveyed in a particular shorebird survey unit as defined in IF&W procedures.
- (2) Number of shorebirds. The mean number of shorebirds for a single species since 1989 at a site is 10% or more of the overall or total mean number observed of that species in the encompassing shorebird survey unit.

NOTE: Shorebird occurrence data is from the current IF&W database as described in procedure created December 22, 1993, and updated September 1, 2005. As new data is entered the mean of the observations is recalculated. The IF&W rating procedure and database information are available at IF&W offices and on line at http://www.maine.gov/ifw/index.html.

- C. Verification of habitat value. An individual may voluntarily submit documention to the department or the Maine Department of Inland Fisheries & Wildlife (IF&W) regarding the value of a shorebird nesting, feeding or staging area. Documentation must be completed by an individual who has experience and training in either wetland ecology or wildlife ecology and therefore has qualifications sufficient to identify and document a high or moderate value shorebird nesting, feeding or staging area, or field verified by IF&W. Following review of such documentation, IF&W may modify the boundary of a high or moderate value shorebird nesting, feeding or staging area depicted on the applicable GIS data layer. A landowner will receive written confirmation of such documentation from the department.
- D. Department determination. If, upon request from a landowner, department staff provide a written field determination or advisory opinion regarding the presence or absence of a high or moderate value shorebird nesting, feeding, and staging area, a landowner acting on that determination or advisory opinion by carrying out an activity subsequently found to be in violation is not required to obtain a permit for that activity and will not be subject to enforcement action if jurisdiction or penalty would be based solely on that activity.
- C. Department determination. A GIS data layer depicting locations of shorebird nesting, feeding, and staging areas is maintained by IF&W and is available from either IF&W or the department. Upon request from a landowner, department staff will provide a written field determination regarding the presence or absence of shorebird nesting, feeding, and staging areas. The department may not seek a civil monetary penalty from a landowner who acted in accordance with a written field determination if the penalty would be based solely on an activity which is a violation of law, but was carried out based on the written field determination.

AUTHORITY: 38 M.R.S.A. §§ 341-D and 480-A et seq.

EFFECTIVE DATE: September 15, 1998

REVISION DATE: